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| Lesson Title: | | Digital Storytelling | | | | | | | | | |
| **Teacher:** | Summer School Reading/LA Teachers | | **Hour:** | | 2:00-3:30 | | | | | | |
| **Week:** | June 13, June 20, June 27 | | **Date:** | | June 14, 15, 21, 22, 26, 27 | | | | | | |
| **Unit:** | Documentary | | **Target Grade Level: 6-8** | | | | | | | | |
| **Course:** | Reading, Writing, Communicating | |  |  | |  |  |  |  |  |  |

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| **Learning Target(s):** | Reading, writing, publishing, collaborating |
| **Criteria for Success:** | Complete engaging, original digital story using IMOVIE |
| **Progression of Learning:** | How to write a story; Elements of digital storytelling; technology applications (IMOVIE, Garage Band); publishing electronic work |

**Unit Type:** ☐Topical Skills-Based ☐Thematic

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| **Essential Questions** |  | **Corresponding Big Ideas** |
| 1. How do you determine the central idea of a text?  2. What are key elements of a story?  3. What key elements distinguish digital stories from written stories?  4. How do you use multimedia to make your story original and engaging?  5. How do you work with your classmates to give and receive feedback to improve your end product?  6. What are ethical considerations when using technology? |  | 1. Central ideas are identified through the key ideas and supporting details. 2. All stories have a beginning, middle and end; problem and solution 3. Storyboards, voice, images, and pacing 4. Using IMOVIE and Garage Band helps to make stories more original and engaging 5. By reviewing work done by peers, and listening to peer input, I am able to revise and refine my end product to meet/exceed criteria for success. 6. Downloading photos; copyrighted material  |  | | --- | |  | |

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| **Priority Standards** | **21st Century Skills and Abilities** | **ISTE NET-S, ITEEA, or L4L Standards Addressed** |
| ***Standard 1 – Oral Expression and Listening***  Engage effectively in a range of collaborative discussions (one-on-one, in groups, and teacher-led) with diverse partners on grade 8 topics, texts,  and issues, building on others’ ideas and expressing their own clearly.  ***Standard 2 – Reading for All Purposes*** Use key ideas and details to determine a central idea of a text and analyze its development over the course of the text, including its relationship to supporting ideas; provide an objective summary of the text.  ***Standard 3 – Writing and Composition***  Write narratives to develop real or imagined experiences or events using effective technique, relevant descriptive details, and well‐structured event sequences. | * **Collaboration and Teamwork** * Critical Thinking, Reasoning, and Problem Solving * **Invention, Innovation, and Creativity** * Self-Direction * **Information Literacy** * Global Awareness * Inquiry Questions * Relevance and Application * Nature of Discipline | **Creativity and Innovation**  Create original works as a means of personal or group expression  **Communication and Collaboration**  Interact, collaborate, and publish with peers employing a variety of digital environments and media  **Digital Citizenship**  Advocate and practice safe, legal, and responsible use of information and technology  **Technology, operations and concepts**  Select and use applications effectively and productively   |  | | --- | |  | |

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| **Pre-Assessment Summary** |  | **Post-Assessment Summary** |
| See attached |  | See attached |

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| **Summary of Differentiation Strategies and Students** |  | **Summary of Research Based Instruction Strategies** |
| Students may work individually or in teams of two. |  | What if teachers could capitalize on student interest in these quick and quirky video clips as a way to help students connect with curriculum?... he medium of digital storytelling offers tremendous opportunities for teachers to engage and assess students. By integrating visual images with written text, digital stories can be used to enhance and accelerate student comprehension (Burmark, 2004; Robin, 2008). For example, when using digital storytelling with middle and high school students, Kajder and Swenson (2004) found that digital stories helped struggling readers envision text and offered a platform for visually communicating meaning. When creating their own digital stories, students encounter an integrated instructional activity that requires them to leverage a host of cognitive, interpersonal, organizational and technical skills (National Middle School Association [NMSA], 2010; Robin, 2008). (Middle School Journal, May 2100. Vol 42;5 p.4-9. |

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| --- | --- | --- |
| **Technology Materials and Resources** |  | **Other Materials and Resources** |
| Articles from current periodicals about Digital Storyboards  Exemplars digital stories for students to model after |  | The seven elements of digital storytelling   |  | | --- | | 1. **Point of view:** Outlines the point of the story and the perspective from which the story is told. 2. **A dramatic question:** Sets the tension of the story by identifying issues to be resolved. 3. **Emotional content:** Engages the audience through common emotions and themes (love, pain, humor). 4. **The gift of your voice:** Helps the audience make meaning of images. 5. **The power of the soundtrack:** Sets the mood of the story. 6. **Economy:** Balances the auditory and visual tracks of meaning. 7. **Pacing:** Sustains the attention of the audience by establishing and modifying the rhythm of the story.   *Adapted from Lambert (2006)* | |

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| **Student Self-Assessment Strategies** |  | **Student Goal Setting Strategies** |
| ✓Ask friends and teachers for input and ideas for improvement as I work on the project. Review, revise, reshape my work based on feedback received.  ✓Provide feedback to others.  ✓Challenge myself to try new technologies that help me communicate my ideas.  ✓Use examples of good work  ✓Refer to the rubric.  ✓Evaluate my work by using the criteria for success outlined on the rubric |  | **Plan:** What do I want to learn  My goal is to:  **Action:** What do I need to do to accomplish my goal?  **Results:**  Did I reach my goal?  Did I follow through with my plan?  Did I see improvements?  Did I give my best effort?  Time spent working on project  Concentration on project  Care in doing my best work  **Reflection:**  What did I do best on this project?  What could I improve on this project?  Did I enjoy the project? Why or Why not.  How could the assignment be improved? |
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| **Tier 1 Interventions (Universal) and Students** |  | **Strategically Planned Questions** |
| **Expectations of students**  -Show up to class on time  -Give best effort while in class  -Behave respectfully  -Participate  -Ask questions  -Set a goal  -Provide, receive and apply feedback  -Visualize the results/end product  -Reflect on content and skills learned  -Identify weaknesses and ways to improve  -Read Tween Tribune daily  -Post one article response and one blog response daily  -Select a topic of interest  -Write a story with Beg/Mid/End and strong transitions  -Create a storyboard  -Implement storyboard using IMOVIE  -Be original and creative using Garage Band  -Present story to class  -Publish story/IMOVIE on teacher tube  -Communicate with teachers in person or via email |  | Why is it important to set goals?  What does it mean to “begin with the end in mind”?  How does getting feedback on your work improve your results?  Why are original stories more engaging?  When is it important to read the news?  Where can you find copyright free music?  Who is responsible for your success? |

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| **Tier 2 Interventions (Targeted) and Students** |  | **Vocabulary** |
| Students are given additional time with instructor before or after class.  Teachers provide guided instruction (small group) throughout steps of project. |  | Attractiveness  Content  Copyright  Ethical  Grammar  Media  Organization  Originality  Requirements  Storyboard  Transition  Voice |

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| **Tier 3 Interventions (Intensive) and Students** |  | **ELL Strategies** |
| Individual tutor assists student with expectations and project so that student may experience success. |  | TPR and visuals to explain vocabulary and applications  Exceptional work shown/modeled for students.  Students encouraged to work in groups of 2-3 |

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|  | Activities and Lesson Procedures | | | Pacing Minutes |
| **Warm Up** | Tween Tribune: Students are to read Tween Tribune and contribute one response to an article and one response to previous blogger. | | | 15 |
| **Motivational Hook** | Teacher selects one or two comments or questions from previous day reflection and shares with class | | | 5 |
| **Direct Teaching** | **Mini lesson** | **Key “take away”**  **Know and be able to do** | **Academic Vocabulary** | 20 |
| Project parameters | I understand the criteria for success as defined in the rubric | Attractiveness, originality, organization, content, requirements, soundtrack, voice, grammar, images, storyboard |
| Formative Assessment | What is formative assessment?  Why does it matter to me?  How do I do it? | Plan, goal, action, criteria for success, learn v. do, results, strategies |
| Identifying key ideas and supporting details | I can identify key ideas and supporting details in Tween tribune current event articles and apply those skills to my own story writing. | Key idea=main idea  detail |
| Elements of a story | I know that every story must have a beg/middle/end, setting,  problem (syn conflict and solution (syn resolution).  I need those elements to engage the audience.  Good story-tellers have organized stories, use transitions, proper grammar and make many edits before publication. | Beg/mid/end  Synonym  Engage  Target audience  Grammar  Transitions=smooth changes  Edits |
| Differences between written/digital story | I know the definition of “media” and can create a storyboard. I understand how “voice” engages the audience | Storyboard  Media  Implement = to work/to do  Voice  (see list above 7 elements) |
| Digital citizenship | I value and use copyright free music and photos. I give credit where credit is due. I am an ethical leaner. | Ethics/ethical  Copyright  Give credit=referencing=citing |
| IMOVIE | I can find the answers to my questions by being resourceful. | Help menus |
| Garage Band | I value originality. | Originality |
| Publishing online | I publish online on a safe website. My virtual safety matters. | Publish  “safe”  virtual |
|  |  |  |
| **Guided Practice** | Students will practice skills and apply knowledge of mini-lesson | | | 5 |
| **Independent Practice** | Students will work on their digital storytelling project | | | 45 |
| **Feedback** | Students will give feedback to one other student and listen to feedback from a student. Students will document what they changed because of the feedback.  (suggest each student has a notebook to capture lesson notes, feedback questions, and closure reflections).  I gave feedback to\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ about \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_.  I received feedback from \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_about\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ and made a change in \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_. | | | 5 |
| **Closure** | Reflection:  Write one skill (something you learned to do) you learned today.  Write one content morsel (something that you learned about) you learned today.  Write one new academic vocabulary word you learned today.  Write one question you have.  Tomorrow, I could teach another student/teacher to \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | | | 10 |
| **Total lesson commitment**  **daily** |  | | | 1 hr: 45 m  115 min |

Digital Storytelling Project

Pre and Post Test

**Part 1: Academic Vocabulary**

Directions: Match the academic vocabulary words in column A with the correct definition in column B.

Column A Column B

\_\_\_\_1. Attractiveness

A. Punctuation and word choice contributes to clarity, style, and story devlopment

B. Doing the right thing; even if no one is watching

C. Various types of technologies and applications

D. The layout of a story on paper which has pictures and words to show story progression

E. Use of font, color, graphics, effects, etc. to enhance presentation

F. Media legally owned by another person; need permission to use media

G. You created the work using your own ideas

H. Covers topic in depth with details and examples.

I. Beginning, middle , end

J. Change from one state or situation to another

K. Necessary “to do’s” to complete the project

L. Quality is clear and consistent through the media and does not detract from message

\_\_\_\_2. Content

\_\_\_\_3. Copyright

\_\_\_\_4. Ethical

\_\_\_\_5. Grammar

\_\_\_\_6. Media

\_\_\_\_7. Organization

\_\_\_\_8. Originality

\_\_\_\_9. Requirements

\_\_\_\_10. Storyboard

\_\_\_\_11. Transition

\_\_\_\_12. Voice

**Part 2: Digital Storytelling**

Directions: Using the vocabulary words in the box, complete each sentence.

beginning problem middle end details

plot conflict media storyboard setting

solution ethical Garage Band title edit

1. In storytelling, a synonym for *problem* is \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_.

2. A story is not a story without \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ and \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_.

3. Where the story takes place is the \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ of the story.

4. Every story has a \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_, \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_, and \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_.

5. Key ideas and supporting \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_help me understand the central idea of the text.

6. Digital stories are different than written stories because they use \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_.

7. A \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_helps you plan out the digital story before working with the technology.

8. When creating a digital story, it is important to be \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_when using another person’s media.

9. By using \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_, I can make my digital story more engaging and original

10. It is important too \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_your work, several times, before publishing it.

**Part 3: Digital Citizenship**

List two ethical considerations when using technology?

1.\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 2. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

**Part 4: Formative Assessment**

1. An action is:

A. plan

B. result

C.hyperbole

D**. What I need to *do* to accomplish my goal**

2. When planning a project, it is important to understand the

1. **Criteria for success**
2. Who your teammates are
3. Where you will do your work
4. the principal’s morning announcements

3. A \_\_\_\_\_\_\_\_\_\_\_\_\_\_ helps you focus and “begin with the end in mind.”

A. Your friend

**B. Goal**

C.Your Language Arts book

D. Ms. Bello

4. A goal states what I want to:

A. become

B. **learn**

C. see

D. play

5. When assigned a project, good students make a:

1. **Plan**

B. quick escape

C. friend with a smart student

D. action

6. When a student \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ on his/her learning and effort, it is important to be honest about what was done well and where improvement could be made.

A. dreams

B.  **Reflects**

C. eats

D. sleeps

7. When you work hard to learn or do something, it is rewarding to see the

A. end, if is finally done

B. look on your teacher’s face

C. **Results**

D.your mom made cookies for you

8. The steps you take to work your plan and reach your goal are called:

A.action

B.results

C.details

D.**Strategies**

**Part 5: Reflection (*Post test ONLY)***

Directions: Reflecting on your project and results, answer the following questions.

1. My goal for this project was:
2. Did I reach my goal? 🖒 🖓
3. Did I follow through with my plan? What happened?
4. Did I see improvements? Describe.
5. What did I do BEST on this project?
6. What could I improve?
7. I also need to evaluate *my effort* on this project.

Time spent working on project ☺ 😐 ☹

Concentration on project ☺ 😐 ☹

Care in doing my best work ☺ 😐 ☹

1. Did I enjoy this project? Why or why not?
2. How could I help my teachers improve this assignment?
3. Was this assignment **valuable** to your reading, writing, and communicating growth? ☺ 😐 ☹

Because of this experience, I know feel I am better at:

(check all that apply)

\_\_\_\_\_\_Telling a story

\_\_\_\_\_\_Writing a storyboard

\_\_\_\_\_\_Making a movie using IMOVIE

\_\_\_\_\_\_Creating original music in garage band

\_\_\_\_\_\_Setting a goal and planning how to accomplish it

\_\_\_\_\_\_Identifying criteria for success/using a rubric

\_\_\_\_\_\_Reflecting on my work and effort

\_\_\_\_\_\_Providing feedback to others

\_\_\_\_\_\_Reading a news story and identifying key ideas and details

\_\_\_\_\_\_Understanding “what it takes” to engage a target audience

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Category** | **Advanced 🟊🟊🟊** | **Proficient**  **🟊🟊** | **In progress**  **🟊** | Teacher Assessment  Name: | Peer Assessment  Name: | My Assessment  of myself |
| **Attractiveness** | Makes excellent use of font, color, graphics, effects to appeal to target audience(s) and keeps audience engaged | Makes good use of font, color, graphics, effects to appeal to target audience(s), occasional these detract from presentation | Makes use of font, color, graphics, effects to appeal to target audience(s), often these detract from presentation | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? |
| **Content** | Covers topic in-depth, with clear key ideas and details and examples. Subject knowledge is excellent | Covers topic in-depth, with key ideas and details and examples. Subject knowledge is good | Covers topic in-depth, with clear key ideas and details and examples. Subject knowledge is excellent | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? |
| **Grammar** | Grammar and word usage are correct and contribute to clarity, style, and story development | Grammar and usage are typically correct and errors do not detract from the story | Grammar and usage errors detract from the story | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? |
| **Images** | Images create a distinct atmosphere or tone that match different parts of the story. Images are student’s original work. | Images create an atmosphere or tone that match part of the story. Majority of the images are original. | An attempt is made to use images to create an atmosphere or tone. There are no original images. | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? |
| **Originality** | Product shows a large amount of original thought. Ideas are creative and inventive. | Product shows some original thought. Work shows new ideas and insights. | Product uses other people’s work and does not provide references/give author credit. | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? |
| **Organization** | Content is well organized with strong story transitions and clear beginning, middle, and end of story. | Content is somewhat organized and story transitions attempted. Beginning, middle, and end of story are not totally clear. | There is no clear or logical organization. It is difficult to define beginning, middle, and end of story. | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? |
| **Presentation** | Well rehearsed with smooth delivery that holds the audience attention. Published on teachertube | Rehearsed with fairly smooth delivery that holds audience attention most of the time. Published on teachertube | Delivery not smooth and audience often lost. Not published. | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? |
| **Soundtrack** | All of the music is original and is created on GarageBand | Most (over half) of the music is original and created on GarageBand | None of the music is original. Music was “borrowed” from someone’s music library. | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? |
| **Storyboard** | Storyboard was key in the development and implementation of the story. | Storyboard is developed, but not foundational to the digital technology implementation of the story. | Storyboard is not completed or does not follow the digital story | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? |
| **Voice** | Voice quality is clear and consistently audible throughout the presentation. Pacing of voice keeps story moving. Enthusiasm of voice engages the audience. | Voice quality is clear and consistently audible throughout the presentation. Pacing of voice keeps story moving. Enthusiasm of voice engages the audience. | Voice quality is clear and consistently audible throughout the presentation. Pacing of voice keeps story moving. Enthusiasm of voice engages the audience. | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? | **🟊🟊🟊**  **🟊🟊**  **🟊**  Why? |
| **Teacher GRADE** |  |  |  | **🟊🟊🟊**  **🟊🟊**  **🟊** |  |  |
| **Peer GRADE** |  |  |  |  | **🟊🟊🟊**  **🟊🟊**  **🟊** |  |
| **My GRADE** |  |  |  |  |  | **🟊🟊🟊**  **🟊🟊**  **🟊** |
| Comments from evaluator | Teacher:  Peer:  Me: | | | | | |
| Lesson learned from this project: | 1.  2.  3. | | | | | |
| Strategies to improve the next time I do this project. | 1.  2.  3. | | | | | |

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## Digital Storytelling: A Tool for Teaching and Learning in the YouTube Generation

|  |
| --- |
| **\*This We Believe Characteristics**   * Meaningful Learning * Challenging Curriculum * Multiple Learning Approaches   \*Denotes the corresponding characteristics from NMSA's position paper, This We Believe, for this article. |

Oliver Dreon, Richard M. Kerper, & Jon Landis

Say the phrase "Charlie bit my finger," and just about every human being with Internet access visualizes the viral video clip of baby Charlie precociously biting the finger of his brother. With almost 200 million views, this video represents just one of thousands of viral videos that form a core component of modern entertainment, news, and advertising (Purcell, 2010). These snippets that people e-mail, post, and pass on to one another faster than the common cold have rapidly moved from the fringe of youth culture to the mainstream.

What if teachers could capitalize on student interest in these quick and quirky video clips as a way to help students connect with curriculum? That is exactly what Tyler Binkley, a first-year teacher and member of the YouTube generation, has set out to do in his middle school math class. Tyler creates online math video vignettes that teach critical math skills (Binkley, 2010), and his unique approach has been featured on television and in other news outlets (e.g., Miller, 2010). His students report going to Tyler's YouTube channel whenever they struggle with a current math task; and with thousands of views, Tyler's videos are a viral hit in Palmyra (PA) Middle School.

In this article, Oliver Dreon and Jon Landis, educational technology professors, and Richard Kerper, a children's and young adolescent literature professor, explain the emergence of Tyler's use of digital storytelling in his middle school classroom. The article outlines how instructional technology and content-specific courses in the teacher education program work in tandem to develop beginning teachers' understanding of digital storytelling as an educational tool. This coordination of efforts offers a framework for incorporating digital storytelling in the middle grades classroom and can also help practicing teachers understand the educational importance and cultural value of the digital storytelling medium.

#### The importance of digital storytelling

Growing up with unprecedented access to technology has changed the way young people, "digital natives," communicate, interact, process information, and learn (Oblinger & Oblinger, 2005; Prensky, 2001a, 2001b). Thus, many new teachers entering 21st century classrooms are digital natives teaching digital natives (Prensky, 2001a). Lei's (2009) study of a group of digital native preservice teachers suggests that, although future teachers may hold strong positive beliefs about technology and may be proficient with a variety of software applications, they may be unable to translate this knowledge to their teaching. "Digital natives," Lei argued, "need to develop a systematic understanding of the technology, subject matter, pedagogy, and how these aspects work together" (p. 93).

Tyler's YouTube math videos make evident that he has been able to incorporate technology effectively in his classroom (Binkley, 2010). While the videos are instructional in nature, each video also tells a humorous story that involves a host of characters and has a distinct plot. Although Tyler's online videos focus on teaching important math concepts, the stories are what ultimately engage his students.

Digital storytelling is the art of combining narrative with digital media such as images, sound, and video to create a short story (Robin, 2008). More than just a simple slideshow of photos set to music, digital stories interweave different media to support the art of telling a tale. In the Digital Storytelling Cookbook, Lambert (2006) identifies seven elements that are critical components of effective digital stories (see Figure 1). While these elements outline the nature of effective digital stories, the process of creating a digital story involves leveraging a wide variety of skills, including researching topics, writing scripts, storyboarding, and assembling the final product using video editing software (Ohler, 2006).

**Figure 1**The seven elements of digital storytelling

|  |
| --- |
| 1. **Point of view:** Outlines the point of the story and the perspective from which the story is told. 2. **A dramatic question:** Sets the tension of the story by identifying issues to be resolved. 3. **Emotional content:** Engages the audience through common emotions and themes (love, pain, humor). 4. **The gift of your voice:** Helps the audience make meaning of images. 5. **The power of the soundtrack:** Sets the mood of the story. 6. **Economy:** Balances the auditory and visual tracks of meaning. 7. **Pacing:** Sustains the attention of the audience by establishing and modifying the rhythm of the story.   Adapted from Lambert (2006) |

The medium of digital storytelling offers tremendous opportunities for teachers to engage and assess students. By integrating visual images with written text, digital stories can be used to enhance and accelerate student comprehension (Burmark, 2004; Robin, 2008). For example, when using digital storytelling with middle and high school students, Kajder and Swenson (2004) found that digital stories helped struggling readers envision text and offered a platform for visually communicating meaning. When creating their own digital stories, students encounter an integrated instructional activity that requires them to leverage a host of cognitive, interpersonal, organizational and technical skills (National Middle School Association [NMSA], 2010; Robin, 2008).

Tyler's journey to using digital storytelling as a means of improving instruction, however, was not a voyage he took accidentally. It represents a culmination of coordinated experiences at Millersville University intended to prepare educators to teach in a connected classroom. These experiences are designed to help teacher candidates recognize technology, pedagogy, content, and context as interdependent aspects of teaching content-based curricula effectively with educational technologies (Harris, Mishra, & Koehler, 2009).

#### Connecting theory and practice with instructional technology

As an undergraduate elementary education major, Tyler enrolled in a course called Instructional Technology in Elementary Education. While the course is designed to instruct teacher candidates about technology integration, the course is not "technocentric" (Papert, 1987). Instead of focusing on specific technologies, it examines how technology can be integrated in different content areas using sound pedagogical approaches. Ultimately, the course helps to develop preservice teachers' technological pedagogical knowledge, which involves an understanding of the effect on teaching and learning when educators incorporate different technologies into lessons (Harris, Mishra, & Koehler, 2009). Each activity in the instructional technology course focuses on pedagogical aspects of technology and how they promote student learning. Teacher candidates do not just complete generic technology projects but develop lessons that incorporate technology into classroom settings.

Digital storytelling is one activity introduced in the instructional technology course. While a more technocentric instructional technology course would focus solely on movie editing software, this class examined digital storytelling as an instructional medium and how it could be used in the teacher candidates' future classrooms. Using the Digital Storytelling Cookbook (Lambert, 2006) as a guide, Dreon and the class discussed different storytelling elements such as point of view and emotional content. They also discussed the potential benefits and challenges of using digital storytelling in classroom settings. For the culminating activity of the digital storytelling unit, each preservice teacher developed a story that could be used in a lesson. For his digital storytelling project, Tyler detailed the Hindenburg crash and told the story from the point of view of a reporter on the scene. He expertly integrated actual footage of the crash and emotionally described the horror of the accident as if he was witnessing it himself.

#### Application in the teacher education program

While the instructional technology course helps teacher candidates develop technological skills and an understanding of technology integration, other classes help model sound technology integration in content areas. These courses demonstrate that technology is a tool for instruction and assessment. For instance, later in his program, Tyler enrolled in the required course Literature for Children and Young Adolescents, taught by Kerper. This course focused on literary genres, aesthetic response to student-selected and professor-selected exemplars in literature (Pradl, 1984; Rosenblatt, 1986), and techniques for sharing literature with children (Kiefer & Tyson, 2009). One technique emphasized in the course was storytelling (MacDonald, 1993), and the primacy of story was foundational to the course (Hardy, 1977; Wenner, 2004; Willingham, 2004). Kerper taught preservice teacher candidates to view narratives as symbolic words having sequence and meaning for those who live, create, or interpret them (Fisher, 1987).

During the semester, preservice teacher candidates read and discussed books in small literary communities, as recommended by Daniels (2002). In previous years, students in the course learned the face-to-face literature sharing technique known as a booktalk (Bodart, 1985). They delivered one booktalk in class, and many continued using the technique once they began teaching in a school. The year Tyler enrolled in the course, Kerper introduced a digital version of the booktalk project.

For the digital booktalk (Gunter & Kenny, 2008; Kenny & Gunter, 2010), preservice teachers worked with tools such as iMovie or Movie Maker to create two-minute trailers for the books they read, similar to movie trailers seen at the cinema (Woods & Beach, 2008). These digital creations communicated aspects of theme, plot, character, and setting to tempt the viewer to read the book on which it was based. Moreover, they represented manifestations of the preservice teachers' aesthetic responses to the literature (Connell, 2000; Rosenblatt, 1986). The digital booktalks provided reading motivation material that preservice teachers could one day share with their students and a model they could use to produce additional motivational pieces in the future.

Once teams had read the pieces of literature they selected, they began creating storyboards, just as the creators of the picture books and other graphic media they read had done (Marcus, 2008; Shulevitz, 1985; Thompson, 2007). They began by thinking about their responses to themes, the protagonist's conflict, and the complications the characters faced. They also began to consider the impact that their visual perspective would have on their viewers' responses. Thus, they were responding to the literature while simultaneously processing their responses metacognitively (Lesley, Watson, & Elliot, 2007).

Applying ideas discussed in the coverage of picture books, teacher candidates decided whether to use a bird's-eye, a worm's-eye, or a head-on view in filming scenes as they reflected on the difference in impact on the viewer. Following this planning, they gathered and took photographs, filmed live action using Flip Video cameras as they performed or directed others, selected segments of music and sound effects, created voice-overs, and inserted titles and other brief text (Grayson, 2010). Then, they faced the challenge of using the software to blend these elements together and made decisions about fade-outs, dissolves, cuts, and other movie-making techniques. Once again, they considered the impact that each would have on the communication. As draft videos were prepared, many teacher candidates used the support services provided by the on-campus digital learning studio that employs tech-savvy students who have been trained to assist them in achieving their goals.

While this work was being completed, Kerper issued each student an invitation to Ning, a social networking tool, as recommended by Duffy (2008). Once draft videos were finished, the teacher candidates uploaded them and the fun began. These novice video makers enjoyed viewing one another's creations and writing viewer comments that let the creators know what had made sense to them in the communication and where they had experienced uncertainty (Yang, Yeh, & Wong, 2010). Using these comments, and stimulated by what they had seen and heard in others' videos, each creative team revised its video—sometimes re-filming, sometimes changing voice-overs, sometimes adjusting volume. The types of revisions were many, and the transformation of the videos was quite apparent.

When the teacher candidates submitted their logs of time worked and summaries of the impact that peers' comments had on the final product, the value of this learning was apparent. Some could see the importance to their future teaching, but many, like Tyler, discovered the power and potential of the tool in making certain that each child in their own classrooms was learning. Tyler's facility with the process of creating digital video may be related to his youth and his familiarity with technology as a digital native. To what extent can professional development play a role in moving digital storytelling across generations in a school faculty?

#### Implications for teachers in all content areas

Making content and connections relevant to students' lives helps bring meaning and purpose to instruction in all content areas. More than a century ago, Dewey (1902) challenged educators to meet students where they are. Digital storytelling connects students to content in ways that they are accustomed to consuming information. Students watch, share, and comment on snippets of videos from TV and movies. They make their own videos and post them to online forums. In fact, the video sharing site YouTube is now serving more than two billion videos per day (Chapman, 2010). The viral video is the cultural currency of today's youth.

**The currency of digital video today**While Tyler's videos are entertaining and educational, the value of their currency derives primarily from the format (Binkley, 2010). His videos epitomize the style of the Internet video vignette with recurring characters, themes, and jokes; thus, their exchange rate among students is high. Students can subscribe to them via a YouTube channel and post them to Facebook just like they have done with the "Charlie bit my finger" video. The videos communicate in the current dialect of the middle grades students Tyler is trying to teach. His development of these short instructional movies involves more than simply learning how to create a digital video; it requires an understanding of storytelling using the current cultural vernacular, and the ability to integrate the medium as an instructional tool to illuminate the content with a population of young adolescents. By creating digital stories that engage middle grades learners, Tyler demonstrates his understanding of the dynamics of the ever-changing youth culture (NMSA, 2010).

**Learning to teach with digital videos**Following the model that Tyler provides, professional development of middle grades teachers across disciplines requires three interdependent foci—the mechanics of video editing, the techniques of modern storytelling, and the integration of the content and the medium. While learning to shoot and edit video is dependent on the availability of equipment and software, the logistics of doing so are straightforward. In contrast, the development of a curricular vision for technology integration requires that teachers see effective examples modeled and participate in collaborative communities that offer support and feedback. Lastly, working with modern storytelling involves a subtler understanding of current popular culture and media consumption, but a universal approach to the creation of a popular or viral video does not appear to exist. There are, however, common elements.

Of the all-time top ten videos viewed on YouTube, six are musical and four are humorous (YouTube, 2010). Thus, music and humor are standard elements of popular online videos. Perhaps as a consequence of YouTube's 10-minute limit to video uploads, digital stories tend to be short, delivered in neat little packages. Therefore, the modern storyteller often uses a framework of humor and music to craft stories that are clever, quick, and funny. The process for achieving this is varies, depending on the creativity of the storyteller and the whim of the viewers en masse. While Tyler's videos are not wildly funny, his subtle humor, clever editing, and storytelling set a context for the delivery of math information.

Through his online digital stories, Tyler creates a way for students to acquire math information in a manner that is palatable and entertaining. The format of these videos is also sensitive to young adolescents' need for social acceptance. Because the videos can be watched repeatedly in a private setting, Tyler's struggling students can view the digital stories without fear of being labeled by their peers.

Although Tyler's videos usually focus on mathematical concepts, digital storytelling can be used in all content areas. For instance, a middle school team could create a digital story to introduce an interdisciplinary project or to support a thematic unit. Teachers could also use digital storytelling as an alternative assessment technique with their students. By drawing on students' writing skills, organizational abilities, and creativity, digital storytelling is an ideal integrative activity that can be incorporated easily in a variety of middle grades settings (Hernandez & De La Paz, 2009; Kajder & Swansen, 2004).

**Issues and challenges**While digital storytelling can be an engaging way to instruct and assess students, some challenges are associated with its implementation. Although our society has become increasingly connected digitally, educators using any web-based form of instruction must be concerned about equal access for all learners, taking into consideration an individual's socioeconomic background and learning needs. While there are many different platforms for creating and sharing digital stories (e.g., iPod Touch, Animoto, ScribePics), teachers using digital storytelling for instruction must weigh the educational benefit for all students and ask themselves, "Would all of my students be able to access content online or benefit equally from its presentation?" While it may be valuable to offer digital stories that are culturally relevant to today's students, teachers need to ensure that all learners have equal access to the content.

#### Conclusion

How we speak to our students is as important as what we say. In today's culture, the noise of information can be deafening, and competing for students' attention can be a matter of broadcasting on the frequencies to which they are listening. The digital story, which dials into digital natives and connects them with the curriculum, represents one of our most powerful instructional tools today.

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| **Extensions** How can your team incorporate digital storytelling into the instructional program? What areas of the curriculum could be most effectively taught through digital stories? What challenges would you face as you implement this instructional approach in your school? |

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**Capturing Stories, Capturing Lives: An Introduction to Digital Storytelling**

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Imagine a learning experience, supported and extended by the application of technology, that empowers students to create and contribute, all within the context of what they are expected to know and be able to do in the 21st Century. Imagine that this learning experience provides students with a compelling and competitive voice and enlarges the boundaries of their ability to communicate, potentially to a worldwide audience. That learning experience is digital storytelling.

Everyone has stories, including our students. Stories come from a variety of places, from a person’s past to their imagination. Some can be funny, some can be painful, but all are personal. Digital storytelling is the process of writing about that story, and adding the multimedia elements of voice, imagery, and music to create a visual story.

**How does the process work?**

The process of digital storytelling can be broken into a series of steps. Following these steps will help ensure that a successful experience will be provided. The end goal of this process is to complete a digital story between 2-3 minutes in length that is composed of about 20-25 images and has a script length of about one page, double-spaced. Steps 1-3 are done in the classroom before a student even uses a computer, steps 4 and 5 are done in a computer lab, and step 6 can occur back in the classroom or any other venue, including online.

**Step 1: Writing**. Digital storytelling first begins with writing (Figure 1). Students write, rewrite, and continue the writing process through multiple drafts. In most cases, this writing takes the form of a personal narrative about a particular story from a student’s life, although the rules and applications of digital storytelling to curriculum are certainly open-ended. It is important to note that the most effective digital stories have their genesis in sound writing, so it is important to emphasize the value of multiple drafts. Within the writing, it is important that the story have a central theme, such as loss, or accomplishment, among others. The importance of this theme is for the viewer of the story; even though the story is about another’s experience, the viewer relates to the story because they have experienced similar types of events in their lives.

**Step 2: Script.** After the narrative is completed, students develop a script. This script is usually a distillation of the essential components of the narrative story.As the digital story is created, the script forms the foundation, and the inclusion of the various multimedia elements serve to rebuild the story. For example, the narrative may be between three or four typed pages. The script resulting from this narrative may be about a page in length. Producing the digital story from the script ensures that the multimedia elements convey and contribute meaning to the story, rather than being included to make the story more “interesting.”

**Step 3: The Storyboard.** In this step, students are required to complete a storyboard to organize the flow of their movie. The storyboard includes a place for the student to associate their script with a visual (still frame or video). At this point, students still have not searched for visuals, however, the storyboarding process permits students to determine or draw the type of imagery that will be associated with a particular portion of the script. This is an essential management tool; when this is done correctly, students (in the next step) will be much more effective in locating their multimedia elements because they have a clear vision of what they are looking for. It is the step most students dislike the most, and that most teachers do not do, but it is essential!

**Step 4: Locating Multimedia.** In this step, students use search tools such as Google (http://www.google.com), Mamma (http://www.mamma.com), Altavista (http://www.altavista.com), alltheweb (http://www.alltheweb.com) and Singingfish (http://www.singingfish.com) to locate still-frame imagery or video. Students may also scan images from photographs from personal collections at this point. It is important to note, depending on the topic of the digital story that students will indeed bring in personal photos; it is important that the computer lab have sufficient scanning capability.

In District 99, we have had excellent success with digital stories that range between 20-25 images in length. We have discouraged the inclusion of video as video adds another layer of complexity to the process, both in the rendering process (making the final movie) and memory storage requirements on our network. Also, we have found that students can create very compelling stories by using still frame imagery. These generally are JPEG images and this number can easily be stored in student’s personal storage space on the District 99 network without any memory space issues. We have also found that digital stories above this number of images begin to lose their effectiveness, as the visuals carry less meaning and are included in the projects simply because students can.

**Step 5: Creating the digital story**: In this step, students create their story using the software available to them.

On Macintosh platforms, this would be iMovie HD. On PC platforms, this might be MovieMaker 2 (available as a free download from Microsoft for XP operating systems), Photostory 3 (also available as a free download from Microsoft and

appropriate for younger students), or Pinnacle Studio 9. In District 99, we support Pinnacle Studio 9 and have had very good success with the product.

To learn the software, the District 99 Instructional Technology Coordinator (me) or a librarian will give a demonstration which takes about 40 minutes-after this, the students are very competent on the software (and bored with my discussion). The students are supported with printed tutorials and in most cases, by having access to a digital storytelling Web site through our Blackboard Learning Management System that gives them access to resources, Web sites, and a discussion board to ask questions of their teachers. Interestingly, many of their classmates end up answering their questions!

Generally, it takes about 4-5 class periods (50 minutes each) to complete the movie. The most difficult component is recording the voice (called the voice- over) from the script. Students, like most people, do not like how they sound when recorded. After a few trials however, most students resolve this issue and push on. We have found that recording their voice-overs in 2-3 sentence “chunks” is most effective; if students make a mistake they do not have to record the entire voice-over, just a small portion of it. To facilitate the recording of voice- overs in a noisy lab, District 99 uses Sennheiser PC-130 noise canceling microphones that allow students who are side by side to record without interfering with each other.

Once the components of the digital story are assembled, students then produce the final movie, a process called *rendering*. We have students render their movies as a Windows Media Player file (we are a PC district) in low quality (160 X 120 pixels) just to determine if the movie is what the student had intended. Once satisfied, we re-render the Pinnacle Studio file into a new Windows Media file of high quality (720 X 480 pixels) for their final product. Students then add the completed movie (turn the movie in) to a shared directory that can be accessed by the teacher so that evaluation can occur. The advantage of the Windows Media file is that it can be played on any PC.

**Step 6: Share.** This is a critical step. Students are generally intensely proud of their creations. Showing their movies in class has a tremendous effect on classroom relationships-they get insights into their fellow students that they would have never known had they not seen their digital stories. Showing the digital stories help students understand each other as human beings, and it helps kids to understand that they all share common experiences, and that the person with the blue hair across the room is not that different from them.

Additionally, students have the opportunity to share their stories with a global audience by uploading their products to DigitalStories.org (http://www.digitalstories.org)

At this point it is important to point out that only steps 4-5 are done in a computer lab. Much of the work required to complete an effective digital storytelling experience can be done in a traditional classroom environment.

**What do students learn?**

The process of digital storytelling provides a high-quality learning experience because the learning experience honors the writing process first. The inclusion of the technology into the process represents a “value-added” approach where the inclusion of the technology extends the learning experience beyond what could be accomplished without technology.

• Digital storytelling develops visual and multimedia literacy in students. Digital storytelling addresses the development of the interpretation of digital media and the application of that interpretation to a personal message or story.

• Digital storytelling provides students with a competitive and compelling voice by enlarging the boundaries of who students can communicate with and by increasing the depth and power of that communication.

• Digital storytelling permits students to recapture creativity, develop it and intensify it, apply it, extend it...

• Digital storytelling helps students write more effectively by permitting the visualization of the writing, resulting in an additional level of perception that extends the writing process to a place seldom reached.

• Digital storytelling provides an authentic personal learning experience- as such; student investment is greatly increased resulting in greatly improved motivation and end product.

• Digital storytelling teaches elements of technology and information literacy-students use many different computer applications and must be conversant about locating and managing visuals and video, as well as being able to do so in the context of copyright and fair use.

**Conclusion**

Digital storytelling provides a truly engaging learning experience which blends writing, technology and emotion to create a compelling product of value. This process is one that students can use throughout entire lives to tell their stories. Many Web sites are now beginning to accept video submissions; will our students in second grade eventually be submitting digital letters to the editor? Time will tell, but in the meantime, the process of digital storytelling provides one of the best learning experiences available to students.

**Figure 1: The Digital Storytelling Process.**

**Websites of interest:**

Center for Digital Storytelling

http://www.storycenter.org

Examples of movies from the Center for Digital Storytelling

http://www.storycenter.org/movies/

DigitalStories.org

http://www.digitalstories.org

Step 1: Write

Step 2: Develop Script

Step 3: Storyboard

Done in Class

Step 4: Locate Resources

Done in Computer Lab

Step 5: Create

Step 6: Share

Storytelling resources from Jakesonline.org

http://www.jakesonline.org/storytelling.htm

Pinnacle Studio 9

http://www.pinnaclesys.com

MovieMaker 2

http://www.microsoft.com/windowsxp/downloads/updates/moviemaker2.mspx

Photostory 3

http://www.microsoft.com/windowsxp/using/digitalphotography/photostory/default. mspx

iMovie HD

http://www.apple.com/ilife/imovie/